

# **ABSTRACT**

The invention relates to a process for producing a flow cell for the spectroscopic analysis of samples to be passed through, the process comprising the following steps:

- (a) provision of a first (10) and of a second (22) window, the second window (22) having at least two sample flow channels (24) for supplying and removing the sample to be analyzed;
- (b) application of a structured thin layer (18) to one of the windows (10, 22);
- (c) contacting and liquid-tight securing of the thin layer (18) to the other (22, 10) window, in such a way that facing, plane-parallel window surfaces (14, 20) of the windows (10, 22) and the thin layer (18) delimit a flow chamber (26) which is accessible only through the sample flow channels (24), the windows (10, 22) being optically transparent at least in some regions at least in the region of the flow chamber (26); and
- (d) filling at least some regions of a filling chamber (28) between the windows (10, 22) which is separated from the flow chamber (26) by the thin layer (18) and adjoins the structured thin layer (18) with adhesive.